

### REMARKS

Claims 25-27 and 30-47 are pending. No new matter has been added by way of the present amendments. For instance, claims 25, 33, 34, 35 and 47 have been amended to indicate that the 107<sup>th</sup> Met is substituted with Leu. This is supported by the present specification at, for example, page 9, line 22 to page 10, line 3. Also, claims 27 and 42 have been amended to adopt amendments suggested by the Examiner.

In view of the following remarks, Applicants respectfully request that the Examiner withdraw all rejections and allow the currently pending claims.

#### Issues Under 35 U.S.C. 112, second paragraph

The Examiner has rejected claims 27 and 42 under 35 U.S.C. 112, second paragraph for the reasons recited at page 4 of the outstanding Office Action. Applicants respectfully traverse.

The Examiner has suggested certain amendments to claims 27 and 42. Applicants have adopted these suggested amendments, which are non-narrowing in nature. Thus, this rejection is moot. Reconsideration and withdrawal thereof are respectfully requested.

#### Issues Under 35 U.S.C. 112, first paragraph

The Examiner has rejected claims 25, 26, 33-35 and 47 under 35 U.S.C. 112, first paragraph for the reasons recited at pages 2-4 of the outstanding Office Action. Applicants respectfully traverse this rejection.

Concerning claims 25, 26 and 47, the Examiner has asserted that these claims, as amended, encompass mutant  $\alpha$ -amylases having a "double substitution" comprising substitution

at the 107<sup>th</sup> Met and a substitution at any of the specific positions recited in the claims. Further, the Examiner asserts that there exists no written description in the rejected claims for substitution at the 107<sup>th</sup> Met for anything other than Leu. Applicants respectfully disagree.

Applicants submit that claims 25 and 47 have been amended to indicate that the substitution at the 107<sup>th</sup> Met is with Leu (M107L). Thus, this aspect of the rejection is moot. Also, Applicants respectfully disagree with the Examiner's characterization of the present invention as lacking sufficient written description for the subject matter of, for instance, claims 25 and 47. Although these claims allow for an additional substitution at the 107<sup>th</sup> Met (substituted with Leu), for instance, a double substitution, such subject matter is supported by the originally filed specification.

A review of the specification reveals that generic language exists to support mutations at locations 11, 16, 49, 84, 144, 167, 169, 178, 188, 190, 205 and 209. For instance, please refer to the present specification at page 6, line 22 to page 7, line 11. Additionally, independent support exists in the specification concerning the Leu substitution at the 107<sup>th</sup> Met position. For instance, the Examiner is respectfully requested to review the present disclosure at page 9, line 22, to page 10, line 3. This particular disclosure is as follows:

In addition, mutations for improving other properties than the heat resistance, for example, a mutation for more enhancing resistance to oxidizing agents, in which **an amino acid residue corresponding to the 107<sup>th</sup> Met is replaced by Leu**, a mutation for enhancing the detergency of a laundry detergent, in which an amino acid residue corresponding to the 188<sup>th</sup> Glu is replaced by Ile, **and/or the like may be combined with the above-described mutations.** (emphasis added).

The above paragraph provides the necessary support for the fact that the M107L mutation may be combined with any of the above discussed mutations. Thus, a double mutation, one of which is the 107<sup>th</sup> Met mutation, is supported by the originally filed specification. Thus, the scope of

claims such as claims 25, 26 and 47 is clearly supported by the originally filed application. That is, one of skill in the art would understand that Applicants were in possession of the claimed subject matter at the time of filing. Accordingly, the aspects of this rejection dealing with claims 25, 26 and 47 are moot.

Concerning claims 33-35, the Examiner asserts that there exists no written description for substitution at the 107<sup>th</sup> Met for anything other than Leu. Applicants submit that claims 33-35 have been amended to indicate that the substitution at the 107<sup>th</sup> is with Leu. Thus, this aspect of the rejection is moot.

In summary, Applicants respectfully submit that the present claims define subject matter which fully satisfies the requirements of 35 U.S.C. § 112, first paragraph. Accordingly, the Examiner is respectfully requested to withdraw this rejection. Allowance of the present claims is therefore solicited.

If the Examiner has any questions or comments, please contact the undersigned at the offices of Birch, Stewart, Kolasch & Birch, LLP.

Dated: November 1, 2005

Respectfully submitted,

By 

John W. Bailey

Registration No.: 32,881

BIRCH, STEWART, KOLASCH & BIRCH, LLP

8110 Gatehouse Rd.

Suite 100 East

P.O. Box 747

Falls Church, Virginia 22040-0747

(703) 205-8000

Attorney for Applicant

  
JWB/CAM/bsh